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EXAMINER

HOOSAIN, ALLAN

ART UNIT

PAPER NUMBER

2645

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Please find below and/or attached an Office communication concerning this application or proceeding.

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Office Action Summary

Application No.

09/393,633

Applicant(s)

SARP ET AL.

Examiner

Terry Teague

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-31 is/are rejected.
- 7) ☒ Claim(s) 18 and 31 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☒ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2.
- 4) ☐ Interview Summary (PTO-413) Paper No(s) ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

DETAILED ACTION

Claim Objections

1. Claim 18 is objected to because of the following informalities: On page 36, line 4, the word "message" should be changed to "signal". Appropriate correction is required.
2. Claim 31 objected to because of the following informalities: On page 43, lines 1, the word "message" should be "signal". Appropriate correction is required.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1 and 3-14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386.

Regarding claim 1, Deutsch et al. discloses a system for screening and deferring the answering of incoming calls (column 1, lines 9-10 fig. 1). The call answering system includes voice mail (column 2, lines 60-61). Deutsch et al. teaches a primary rate interface (PRI) connects the switching system to the voice messaging system (VMS) (column 2, lines 51-53). Deutsch et al. further teaches the VMS is used to record and store messages for callers (column 4, lines 16-22) at telephone set 18 connected to a switching system 18 [telephone exchange switch] (column 2, lines 65-66). Deutsch et al. further teaches a telephone display that displays a caller's telephone number, name and call treatment options (column 3, lines 15-17). Deutsch et al. also

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teaches if the calling party information cannot be obtained using the advanced intelligence unit (AIU), the system can provide an identity function. If the user (called party) presses the identity button, a message is sent to the voice mail system (VMS) [message exchange between telephone exchange switch and voice mail system]. The VMS prompts the caller for a name. The caller can speak their name. The name is transmitted through the switching system to telephone set 18 display [message received from telephone exchange] (column 3, lines 44-60). Once the caller's name is displayed on telephone set 18 display, the user can depress button 22d [manual switch], which sends a message (signal – predetermined response) to the VMS requesting the VMS to announce “please wait” to the caller (column 3, lines 23-27, 62-67, column 4, lines 1-2) (The VMS then announces “please wait” via the switching system [telephone exchange switch] to the caller).

Deutsch et al. does not teach a telephone exchange switch having means for forming predetermined messages.

Rogers et al. discloses a call management system (column 1, lines 43-44 fig. 1). Rogers et al. teaches the call management computer 101 can be combined with PBX switch 104 (column 7, lines 57-60, column 9, lines 17-20). Rogers et al. further teaches pre-recorded [pre-determined] messages can be selected for callers on a VIP list (column 37, lines 5-9).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to modify the call answering system of Deutsch et al. to include a telephone exchange switch having means for forming predetermined messages, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

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Regarding claim 3, Deutsch et al. as modified by Rogers et al. in claim 1 above teaches once the caller's name is displayed on telephone set 18 display, the user can depress button 22d [manual switch], which sends a message (signal) to the VMS requesting the VMS to announce "please wait" to the caller (column 3, lines 23-27, 62-67, column 4, lines 1-2). Deutsch further teaches the caller is placed on-hold and a message is sent from the VMS to the telephone set 18 informing the called party that a "parked" call can be retrieved [information regarding conditions associated with a said voice mail system]. A message associated with the parked call is displayed for the caller (column 4, lines 25-28, 38-43).

Deutsch et al. as modified by Rogers et al. in claim 1 above fails to teach means for forming predetermined messages for said message exchange includes preprogrammed computer processors.

Rogers et al. teaches multiple DSPs for performing multiple tasks (column 18, lines 58-65, column 19, lines 20-60) (example: text to speech conversion -- column 19, line 56).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include means for forming predetermined messages for said message exchange includes preprogrammed computer processors, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 4, Deutsch et al. as modified by Rogers et al. in claim 1 above further teaches the display shows the name and telephone number for the calling party and lists treatment options for controlling the call (column 3, lines 15-17).

Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said voice mail system includes means for obtaining a calling party's number from an incoming telephone signal.

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Rogers et al. teaches the user receives a new voice mail message and the telephone number of the caller is displayed in the call management window [display device] (column 44, lines 62-67, column 45, lines 1-4 fig. 1).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said voice mail system includes means for obtaining a calling party's number from an incoming telephone signal, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 5, Deutsch et al. as modified by Rogers et al. in claims 1 and 4 above further teaches the switching system retrieves the caller's telephone number of the incoming call from the AIU unit and sends the information through an ISDN line 19 to telephone set 18 display (column 3, lines 31-36).

Deutsch et al. as modified by Rogers et al. in claims 1 and 4 does not teach said means for obtaining a calling party's number from an incoming telephone signal includes means for selectively prompting a caller to enter predefined digits.

Rogers et al. teaches proactive caller identification. The caller can be prompted to enter their phone number (column 23, lines 25-46).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said means for obtaining a calling party's number from an incoming telephone signal includes means for selectively prompting a caller to enter predefined digits, as taught by Rogers et al, to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

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Regarding claim 6, Deutsch et al. as modified by Rogers et al. in claim 1 above further teaches when a caller receives an incoming call, the caller's name and telephone number, from AIU 6 are displayed via the switching system 2 along with treatment options [response message]. Pressing one of the display options activates that option (column 3, lines 7-12).

Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said voice mail system includes means for obtaining a calling party's number from an incoming telephone signal.

Rogers et al. teaches the caller's number can be obtained with the use of caller ID (column 11, lines 58-59) (Certain callers can be directly transferred to voice mail (column 37, line 43) (voice mail system using caller ID to receive messages).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said voice mail system includes means for obtaining a calling party's number from an incoming telephone signal, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 7, Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said voice mail system includes means for controlling said means for displaying alphanumeric characters in a human readable form in the absence of a connection between a telephone set and a mailbox associated with said telephone set.

Rogers et al. teaches when a user receives a new voice mail message, the call management system is notified by voice mail services with the display of a highlighted "voice mail" button on the user's monitor (column 28, lines 55-61).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said voice mail system includes means for controlling said means for displaying alphanumeric characters in a human readable form in the absence of a connection between a telephone set and a mailbox associated with said telephone set, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 8, Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said system includes a plurality of telephone sets connected to said telephone exchange switch, each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, said system further comprising means for distributing a message from a first telephone set for receipt by at least one second telephone set without said first telephone set having accessed a designated message location associated therewith, said message being deliverable to a message location associated with said at least one second telephone set using said data link responsive to a user of said first telephone set activating said at least one manual switch.

Rogers et al. teaches the call management computer and the PBX can be combined (column 9, lines 17-20). Rogers teaches multiple telephone sets are used with the system (column 7, lines 13-19). Rogers et al. further teaches system users have mailbox numbers (column 43, lines 43-48). When users receive a call, a "voice mail" button is highlighted on the user's display (column 28, lines 55-61). Rogers et al. also teaches the user can transfer a call [messages] to a second user within the system by selecting a speed transfer button (column 13,

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lines 16-19) (Once the call is transferred to the second station within the system, the incoming call [message] is located at the second station (a telephone set is included) [second telephone set].

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said system includes a plurality of telephone sets connected to said telephone exchange switch, each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, said system further comprising means for distributing a message from a first telephone set for receipt by at least one second telephone set without said first telephone set having accessed a designated message location associated therewith, said message being deliverable to a message location associated with said at least one second telephone set using said data link responsive to a user of said first telephone set activating said at least one manual switch, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 9, Deutsch et al. as modified by Rogers et al. in claims 1 and 8 above does not teach said message is a voice memo directed from said first telephone set to said second telephone set and said switch includes means to initiate a call to said voice mail system, said call including a designated message location associated with said second telephone set.

Rogers et al. teaches a system user can call a second system user [message is a voice memo]. If the second user does not answer his phone, the call can be redirected to the second user's voice mail with predetermined VIP rules (column 44, lines 41-43, 44-57).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said message is a voice memo directed from said first telephone set to said second telephone set and said switch includes means to initiate a call to said voice mail system, said call including a designated message location associated with said second telephone set, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 10, Deutsch et al. as modified by Rogers et al. in claim 1 above further teaches an ACD functionality [automated call distribution system] for queuing incoming calls (column 5, lines 22-35). Deutsch et al. also teaches telephone sets 6a and 18 connected to the switching system [telephone exchange switch] (fig. 1). Deutsch et al. teaches the ACD functionality can be combined with the "please hold" functionality so multiple incoming calls can be placed on hold with the names and telephone numbers of callers displayed on telephone set 18 (column 5, lines 30-35) (The called party can determine the state of the telephone set). With the combined functionality of ACD and the "please hold", when there is an incoming call, the user can press the "please wait" button. A message [state message] is sent to the VMS, which responds with a "please wait" announcement to the caller (column 3, lines 62-67, column 4, lines 1-2).

Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, and said voice mail system further including means for monitoring each said state

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message and transferring incoming telephone calls to telephone sets for which said respective state message indicates as being idle.

Rogers et al. teaches user's telephones (workstations with telephone sets) having mailbox locations (column 44, lines 47-50). Rogers et al. teaches a system user can access voice mail by using a telephone (column 28, lines 65-67). Rogers et al. further teaches if an incoming call is received and the called party is already using his phone, the call can be transferred to another telephone within the system by selecting a transfer screen and selecting a system user from a directory to send the call to (column 13, lines 13-19).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, and said voice mail system further including means for monitoring each said state message and transferring incoming telephone calls to telephone sets for which said respective state message indicates as being idle, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 11, Deutsch et al. as modified by Rogers et al. in claims 1 and 10 further teaches the system can be used to disconnect a caller. After the caller ID is displayed on telephone set 18, the caller party has the option to disconnect the caller by depressing the "disconnect" button. Once the "disconnect" button is pressed, a message is sent to the VMS. The VMS informs the calling party that the connection is going to be disconnected. The VMS

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instructs the switching system to disconnect the call (column 4, lines 63-67, column 5, lines 1-11) ([includes means] – called party [selectively initiating] presses “disconnect” button).

Deutsch et al also teaches after a user receives caller information on telephone set 18 display with call treatment options (column 3, lines 15-17), the user can press the “please wait” button to send a message [state message] to the VMS via the switching system (column 3, lines 62-67, column 4, lines 1-2).

Regarding claim 12, Deutsch et al. as modified by Rogers et al. in claim 1 further teaches an ACD functionality [automated call distribution system] for queuing incoming calls (column 5, lines 22-25). Deutsch et al. also teaches telephone sets 6a and 18 connected to the switching system [telephone exchange switch] (fig. 1).

Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach each of said telephone sets having a designated message location associated with said voice mail system, wherein said voice mail system includes means for controlling information displayed on said display device operable by a user of at least one said telephone set without said at least one telephone set being interconnected by a voice connection to its respective message location.

Rogers et al. teaches user's telephones (workstations with telephone sets) having mailbox locations (column 44, lines 47-50). Rogers also teaches when a user receives a voice mail message, the call management system is notified by the voice mail system. The user is notified of the voice mail message with a highlighted “voice mail” button on his monitor (column 28, lines 56-61).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include each of said

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telephone sets having a designated message location associated with said voice mail system, wherein said voice mail system includes means for controlling information displayed on said display device operable by a user of at least one said telephone set without said at least one telephone set being interconnected by a voice connection to its respective message location, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 13, Deutsch et al. as modified by Rogers et al. in claims 1 and 12 teaches an incoming caller's name, telephone number, and a list of call treatment options is displayed on telephone set 18 [sending an initial message to open the display device] (column 3, lines 15-17). Deutsch et al. further teaches ACD functionality combined with the "please wait" functionality for queuing incoming calls (column 5, lines 22-35) (Information regarding the ACD, the number of callers on hold, is provided. By answering the call (column 3, lines 17-19) or disconnecting the call (column 4, lines 63-67, column 5, lines 1-11), Deutsch et al. indicates caller information on telephone display 18 is removed).

Regarding claim 14, Deutsch et al. as modified by Rogers et al. in claim 1 above teaches telephone sets 6a and 18 connected the switching system (fig. 1). Deutsch et al. also teaches when a user receives an incoming call, the caller's name, telephone number, and a list of call treatment options is displayed on telephone set 18 (column 3, lines 15-17). Deutsch et al. teaches the user can place a caller on hold by pressing the "hold" button. A message is sent to the VMS [updating information used by said voice mail system with respect to each said telephone set] (column 3, lines 62-67, column 4, lines 1-2).

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Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach each of said telephone sets having a designated message location associated with said voice mail system.

Rogers et al. teaches user's telephones (workstations with telephone sets) having mailbox locations (column 44, lines 47-50).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al., to include each of said telephone sets having a designated message location associated with said voice mail system, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

5. Claims 17-19, 21-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386.

Regarding claim 17, Deutsch et al. discloses a system for screening and deferring the answering of incoming calls (column 1, lines 9-10 fig. 1). The call answering system includes voice mail (column 2, lines 60-61). Deutsch et al. teaches a primary rate interface (PRI) connects the switching system to the voice messaging system (VMS) (column 2, lines 51-53). Deutsch et al. further teaches the VMS is used to record and store messages for callers (column 4, lines 16-22) at telephone set 18 connected to a switching system 18 [telephone exchange switch] (column 2, lines 65-66). Deutsch et al. further teaches a telephone display that displays a caller's telephone number, name and call treatment options (column 3, lines 15-17). Deutsch et al. also teaches if the calling party information cannot be obtained using the advanced intelligence unit (AIU), the system can provide an identity function. If the user (called party) presses the identity button, a message is sent to the voice mail system (VMS) [message exchange between telephone

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exchange switch and voice mail system]. The VMS prompts the caller for a name. The caller can speak their name. The name is transmitted through the switching system to telephone set 18 display [means for displaying being operable in response to at least one message received from telephone exchange] (column 3, lines 44-60). Once the caller's name is displayed on telephone set 18 display, the user can depress button 22d [manual switch operatively associated with said means for displaying], which sends a message (signal) through the switching system to the VMS requesting the VMS to announce "please wait" to the caller (column 3, lines 23-27, 62-67, column 4, lines 1-2) (forming a predetermined message using the switching system and the VMS). The VMS then announces "please wait" via the switching system [telephone exchange switch] to the caller) (exchanging the predetermined message between the VMS and the switching system).

Deutsch et al. does not teach a telephone exchange switch having means for forming predetermined messages.

Rogers et al. discloses a call management system (column 1, lines 43-44 fig. 1). Rogers et al. teaches the call management computer 101 can be combined with PBX switch 104 (column 7, lines 57-60, column 9, lines 17-20). Rogers et al. further teaches pre-recorded [pre-determined] messages can be selected for callers on a VIP list (column 37, lines 5-9).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to modify the call answering system of Deutsch et al. to include a telephone exchange switch having means for forming predetermined messages, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

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Regarding claim 18 Deutsch et al. as modified in claim 17 above also teaches if the calling party information can not be obtained using the advanced intelligence unit (AIU), the system can provide an identity function. If the user (called party) presses the identity button, a message is sent to the voice mail system (VMS) [message exchange between telephone exchange switch and voice mail system]. The VMS prompts the caller for a name. The caller can speak their name. The name is transmitted through the switching system to telephone set 18 display [message received from telephone exchange] (column 3, lines 44-60). Once the caller's name is displayed on telephone set 18 display, the user can depress button 22d, which sends a message (signal- predetermined response) to the VMS requesting the VMS to announce "please wait" to the caller (column 3, lines 23-27, 62-67, column 4, lines 1-2).

Regarding claim 19, Deutsch et al. as modified by Rogers et al. in claim 17 above teaches once the caller's name is displayed on telephone set 18 display, the user can depress button 22d [manual switch], which sends a message (signal) to the VMS requesting the VMS to announce "please wait" to the caller (column 3, lines 23-27, 62-67, column 4, lines 1-2). Deutsch further teaches the caller is placed on-hold and a message is sent from the VMS to the telephone set 18 informing the called party that a "parked" call can be retrieved [information regarding conditions associated with a said voice mail system]. A message associated with the parked call is displayed for the caller. The called party can the depress the button associated with the parked call (column 4, lines 25-28, 38-43).

Deutsch et al. as modified by Rogers et al. in claim 17 above fails to teach means for forming predetermined messages for said message exchange includes preprogrammed computer processors.

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Rogers et al. teaches multiple DSPs for performing multiple tasks (column 18, lines 58-65, column 19, lines 20-60) (example: text to speech conversion -- column 19, line 56).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include means for forming predetermined messages for said message exchange includes preprogrammed computer processors, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 21, Deutsch et al. as modified by Rogers et al. in claims 17 and 20 above further teaches the switching system retrieves the caller's telephone number of the incoming call from the AIU unit and sends the information through an ISDN line 19 to telephone set 18 display (column 3, lines 31-36).

Deutsch et al. as modified by Rogers et al. in claims 17 and further modified by Kaplan in claim 20 does not teach said means for obtaining a calling party's number from an incoming telephone signal includes means for selectively prompting a caller to enter predefined digits.

Rogers et al. teaches proactive caller identification. The caller can be prompted to enter their phone number (column 23, lines 25-46).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said means for obtaining a calling party's number from an incoming telephone signal includes means for selectively prompting a caller to enter predefined digits, as taught by Rogers et al, to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 22, Deutsch et al. as modified by Rogers et al. in claim 17 above further teaches when a caller receives an incoming call, the caller's name and telephone number, from AIU 6 are displayed via the switching system 2 along with treatment options [response message]. Pressing one of the display options activates that option (column 3, lines 7-12).

Deutsch et al. as modified by Rogers et al. in claim 17 above does not teach said voice mail system includes means for obtaining a calling party's number from an incoming telephone signal.

Rogers et al. teaches the caller's number can be obtained with the use of caller ID (column 11, lines 58-59) (Certain callers can be directly transferred to voice mail (column 37, line 43) (voice mail system using caller ID to receive messages).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said voice mail system includes means for obtaining a calling party's number from an incoming telephone signal, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 23, Deutsch et al. as modified by Rogers et al. in claim 17 above does not teach said voice mail system includes means for controlling said means for displaying alphanumeric characters in a human readable form in the absence of a connection between a telephone set and a mailbox associated with said telephone set.

Rogers et al. teaches when a user receives a new voice mail message, the call management system is notified by voice mail services with the display of a highlighted "voice mail" button on the user's monitor (column 28, lines 55-61).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said voice mail system includes means for controlling said means for displaying alphanumeric characters in a human readable form in the absence of a connection between a telephone set and a mailbox associated with said telephone set, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 24, Deutsch et al. as modified by Rogers et al. in claim 17 above does not teach said system includes a plurality of telephone sets connected to said telephone exchange switch, each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, said system further comprising means for distributing a message from a first telephone set for receipt by at least one second telephone set without said first telephone set having accessed a designated message location associated therewith, said message being deliverable to a message location associated with said at least one second telephone set using said data link responsive to a user of said first telephone set activating said at least one manual switch.

Rogers et al. teaches the call management computer and the PBX can be combined (column 9, lines 17-20). Rogers teaches multiple telephone sets are used with the system (column 7, lines 13-19). Rogers et al. further teaches system users have mailbox numbers (column 43, lines 43-48). When users receive a call, a "voice mail" button is highlighted on the user's display (column 28, lines 55-61). Rogers et al. also teaches call tags. A system user can create and attach a voice message [voice memo] to an incoming telephone call. The call along

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with the call tag can be transferred to a second system user once the system user depresses the speed transfer button (column 39, lines 15-39) (column 13, lines 16-19) (Once the call is transferred to the second station user within the system, the incoming call [message] is located at the second station (a telephone set is included) [second telephone set].

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said system includes a plurality of telephone sets connected to said telephone exchange switch, each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, said system further comprising means for distributing a message from a first telephone set for receipt by at least one second telephone set without said first telephone set having accessed a designated message location associated therewith, said message being deliverable to a message location associated with said at least one second telephone set using said data link responsive to a user of said first telephone set activating said at least one manual switch, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 25, Deutsch et al. as modified by Rogers et al. in claim 17 above further teaches an ACD functionality [automated call distribution system] for queuing incoming calls (column 5, lines 22-35). Deutsch et al. also teaches telephone sets 6a and 18 connected to the switching system [telephone exchange switch] (fig. 1). Deutsch et al. teaches the ACD functionality can be combined with the "please hold" functionality so multiple incoming calls can be placed on hold with the names and telephone numbers of callers displayed on telephone

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set 18 (column 5, lines 30-35) (The called party can determine the state of the telephone set).

With the combined functionality of ACD and the “please hold”, when there is an incoming call, the user can press the “please wait” button. A message [state message] is sent to the VMS, which responds with a “please wait” announcement to the caller (column 3, lines 62-67, column 4, lines 1-2).

Deutsch et al. as modified by Rogers et al. in claim 17 above does not teach each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, and said voice mail system further including means for monitoring each said state message and transferring incoming telephone calls to telephone sets for which said respective state message indicates as being idle.

Rogers et al. teaches user's telephones (workstations with telephone sets) having mailbox locations (column 44, lines 47-50). Rogers et al. teaches a system user can access voice mail by using a telephone (column 28, lines 65-67). Rogers et al. further teaches if an incoming call is received and the called party is already using his phone, the call can be transferred to another telephone within the system by selecting a transfer screen and selecting a system user from a directory to send the call to (column 13, lines 13-19).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include each of said telephone sets having a designated message location associated with said voice mail system, each said message location being accessible by a respective telephone set for communication therebetween, and said voice mail system further including means for monitoring each said state

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message and transferring incoming telephone calls to telephone sets for which said respective state message indicates as being idle, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 26, Deutsch et al. as modified by Rogers et al. in claims 17 and 25 further teaches the system can be used to disconnect a caller. After the caller ID is displayed on telephone set 18, the caller party has the option to disconnect the caller by depressing the "disconnect" button. Once the "disconnect" button is pressed, a message is sent to the VMS. The VMS informs the calling party that the connection is going to be disconnected. The VMS instructs the switching system to disconnect the call (column 4, lines 63-67, column 5, lines 1-11) ([includes means] – called party [selectively initiating] presses "disconnect" button). Deutsch et al also teaches after a user receives caller information on telephone set 18 display with call treatment options (column 3, lines 15-17), the user can press the "please wait" button to send a message [state message] to the VMS via the switching system (column 3, lines 62-67, column 4, lines 1-2).

Regarding claim 27, Deutsch et al. as modified by Rogers et al. in claim 17 further teaches an ACD functionality [automated call distribution system] for queuing incoming calls (column 5, lines 22-25). Deutsch et al. also teaches telephone sets 6a and 18 connected to the switching system [telephone exchange switch] (fig. 1).

Deutsch et al. as modified by Rogers et al. in claim 17 above does not teach each of said telephone sets having a designated message location associated with said voice mail system, wherein said voice mail system includes means for controlling information displayed on said

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display device operable by a user of at least one said telephone set without said at least one telephone set being interconnected by a voice connection to its respective message location.

Rogers et al. teaches user's telephones (workstations with telephone sets) having mailbox locations (column 44, lines 47-50). Rogers also teaches when a user receives a voice mail message, the call management system is notified by the voice mail system. The user is notified of the voice mail message with a highlighted "voice mail" button on his monitor (column 28, lines 56-61).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include each of said telephone sets having a designated message location associated with said voice mail system, wherein said voice mail system includes means for controlling information displayed on said display device operable by a user of at least one said telephone set without said at least one telephone set being interconnected by a voice connection to its respective message location, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

Regarding claim 28, Deutsch et al. as modified by Rogers et al. in claims 17 and 27 teaches an incoming caller's name, telephone number, and a list of call treatment options is displayed on telephone set 18 [sending an initial message to open the display device] (column 3, lines 15-17). Deutsch et al. further teaches ACD functionality combined with the "please wait" functionality for queuing incoming calls (column 5, lines 22-35) (Information regarding the ACD, the number of callers on hold, is provided. By answering the call (column 3, lines 17-19)

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or disconnecting the call (column 4, lines 63-67, column 5, lines 1-11), Deutsch et al. indicates caller information on telephone display 18 is removed).

Regarding claim 29, Deutsch et al. as modified by Rogers et al. in claim 17 above teaches telephone sets 6a and 18 connected the switching system (fig. 1). Deutsch et al. also teaches when a user receives an incoming call, the caller's name, telephone number, and a list of call treatment options is displayed on telephone set 18 (column 3, lines 15-17). Deutsch et al. teaches the user can place a caller on hold by pressing the "hold" button. A message is sent to the VMS [updating information used by said voice mail system with respect to each said telephone set] (column 3, lines 62-67, column 4, lines 1-2).

Deutsch et al. as modified by Rogers et al. in claim 17 above does not teach each of said telephone sets having a designated message location associated with said voice mail system.

Rogers et al. teaches user's telephones (workstations with telephone sets) having mailbox locations (column 44, lines 47-50).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al., to include each of said telephone sets having a designated message location associated with said voice mail system, as taught by Rogers et al., to directly control calls to an organization with user workstation computers (column 1, lines 63-65).

6. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386 and in further view of Choi U.S. Patent 5,844,968.

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Regarding claim 2, Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said data communications link is a serial communications link.

Choi discloses an interfacing apparatus, which allows communication between an exchange and an independent voice mail system (column 1, lines 16-21 fig. 1). Choi teaches an RS232C line 223 between the telephone system 221 and the independent voice mail system 224 (column 5, lines 44-48 fig. 2).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said data communications link is a serial communications link, as taught by Choi, to provide a technique for interfacing an independent voice mail system to an exchange, to allow more simply controlled interfacing (column 3, lines 13-16).

7. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386 and in further view of Brunson et al. U.S. Patent 5,311,576.

Regarding claim 15, Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said voice mail system maintains a database of information relating to each said telephone set and a respective designated message location thereof, and said means for supplying information regarding each respective telephone set includes means for supplying information to update said database.

Brunson et al. discloses an adjunct processor embedded in a switching system (column 1, lines 1-3 fig. 2). Brunson et al teaches the voice mail system executes an emulation function 205. Emulation function 205 communicates with control processor 101 on behalf of the voice mail

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system module 200. One or more digital display telephones is emulated, one for each port. Voice mail system port information is stored in the administration database (column 6, lines 14-29) (By executing a new emulation function, the number of emulated digital telephones can be configured for adjusting the number of ports. That new information is stored in the administration database of the switching system [supplying information to update said database].

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said voice mail system maintains a database of information relating to each said telephone set and a respective designated message location thereof, and said means for supplying information regarding each respective telephone set includes means for supplying information to update said database, as taught by Brunson et al., to provide an adjunct processor that may be connected to any one of the medium's circuit-pack slots to which digital port circuits are allowed to be connected (column 20-22).

8. Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386 and in further view of O'Donovan et al. U.S. Patent 6,396,908 B1.

Regarding claim 16, Deutsch et al. as modified by Rogers et al. in claim 1 above teaches an identify function. If the user (called party) presses the identify button, a message is sent to the voice mail system (VMS) [resulting from message exchange between said telephone exchange switch and said VMS]. The VMS prompts the caller for a name [message from said voice mail system]. The caller can speak their name. The name is transmitted through the switching system to telephone set 18 display [responsive to said message received from said telephone exchange

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switch] (column 3, lines 44-60). Once the caller's name is displayed on telephone set 18 display, the user can depress button 22d [manual switch], which sends a message (signal) to the VMS via the switching system [sending a signal to said telephone exchange switch] [said signal being indicative of a predetermined response] (column 3, lines 23-27, 62-67, column 4, lines 1-2).

Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach said telephone exchange switch is a first telephone exchange switch, said system further comprising: a second telephone exchange switch remotely disposed from said first telephone exchange switch, providing means for electronically connecting said second telephone exchange switch to said first telephone exchange switch through the internet, providing at least one second telephone set in electronic communication with said second telephone exchange switch, second telephone set including means for displaying alphanumeric characters in human readable form, said means for displaying being operable responsive to at least one message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system, through the internet and said first telephone exchange switch responsive to said message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system through the internet and said first telephone exchange switch, said signal being indicative of a predetermined response to said message from said voice mail system.

O'Donovan et al. discloses a method and apparatus for transferring messages between two remote parties (column 1, lines 7-8 fig. 1). O'Donovan et al. teaches a [first telephone exchange switch] PBX 12 (fig. 1). O'Donovan et al. further teaches [second telephone exchange switch] PBX 22 is located remotely from PBX 12 [first telephone exchange switch] (column 5,

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lines 17-31 fig. 1). O'Donovan et al. also teaches PBX 22 [second telephone exchange switch] is connected to PBX 12 [first telephone exchange switch] through the internet via data network access devices 14 and 24 (column 5, lines 23-31 fig. 1). O'Donovan et al. teaches a telephone [second telephone] is connected to PBX 22 [second telephone exchange switch] (fig. 1).

O'Donovan et al. further teaches Data network access device 24 receives a message from VMS 16 through PBX 12 [first telephone exchange switch], data network access device 14, and the data network 40 [internet]. The message is deposited in VMS 26 via PBX 22 [second telephone exchange switch] [said means for displaying being operable responsive to at least one message received from second telephone exchange switch resulting from said message exchange between second telephone exchange switch and said voice mail system, through the internet and said first telephone exchange switch]. The called party telephone 21 is given an indication of the message by an onscreen display [second telephone set including means for displaying alphanumeric characters in a human readable form] (column 7, lines 13-23 fig. 1).

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include said telephone exchange switch is a first telephone exchange switch, said system further comprising: a second telephone exchange switch remotely disposed from said first telephone exchange switch, providing means for electronically connecting said second telephone exchange switch to said first telephone exchange switch through the internet, providing at least one second telephone set in electronic communication with said second telephone exchange switch, second telephone set including means for displaying alphanumeric characters in human readable form, said means for displaying being operable responsive to at least one message received from said second

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telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system, through the internet and said first telephone exchange switch responsive to said message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system through the internet and said first telephone exchange switch, said signal being indicative of a predetermined response to said message from said voice mail system, as taught by O'Donovan et al., to provide a less expensive telecommunication connection for long distance calls (column 2, lines 18-22).

9. Claim 20 is rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386 and in further view of Kaplan U.S. Patent 6,396,906 B1.

Regarding claim 20, Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach obtaining a calling party's number from an incoming telephone signal, using said voice mail system, forming a predetermined message for data transmission to said telephone exchange switch using said voice mail system, and transmitting said predetermined message to said telephone exchange switch to cause said display device to display characters indicative of said calling party's number.

Kaplan discloses a telephone answering system that automatically calls back a caller that has left a message (column 1, lines 1-4 fig. 1). Kaplan teaches the telephone answering system uses caller ID to get an incoming caller's phone number (column 3, lines 46-48). Kaplan further teaches if a phone number has been left for the called party, the called party is given the option to have the voice message system control the PBX (forming a predetermined message for data

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transmission to the PBX using the voice mail system) to automatically dial the phone number (column 4, lines 1-13). Kaplan also teaches if the called party chooses the option to have the phone number automatically dialed, the telephone number to be dialed is displayed to the called party (column 4, lines 14-19)

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include teach obtaining a calling party's number from an incoming telephone signal, using said voice mail system, forming a predetermined message for data transmission to said telephone exchange switch using said voice mail system, and transmitting said predetermined message to said telephone exchange switch to cause said display device to display characters indicative of said calling party's number, as taught by Kaplan, to provide a system where a specified phone number from a caller could be automatically dialed back, in conjunction with a message left by the caller (column 1, lines 55-57).

10. Claims 30 and 31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Deutsch et al. U.S. Patent 6,028,922 in view of Rogers et al. U.S. Patent 5,946,386 and in further view of O'Donovan et al. U.S. Patent 6,396,908 B1

Regarding claim 30, Deutsch et al. as modified by Rogers et al. in claim 17 above teaches an identify function. If the user (called party) presses the identify button, a message is sent to the voice mail system (VMS) [resulting from message exchange between said telephone exchange switch and said VMS]. The VMS prompts the caller for a name [message from said voice mail system]. The caller can speak their name. The name is transmitted through the switching system to telephone set 18 display [responsive to said message received from said telephone exchange

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switch] (column 3, lines 44-60). Once the caller's name is displayed on telephone set 18 display, the user can depress button 22d [manual switch], which sends a message (signal) to the VMS via the switching system [sending a signal to said telephone exchange switch] [said signal being indicative of a predetermined response] (column 3, lines 23-27, 62-67, column 4, lines 1-2).

Deutsch et al. as modified by Rogers et al. in claim 1 above does not teach providing a second telephone exchange switch remotely disposed from said first telephone exchange switch, providing means for electronically connecting said second telephone exchange switch to said first telephone exchange switch through the internet, providing at least one second telephone set in electronic communication with said second telephone exchange switch, said second telephone set including means for displaying alphanumeric characters in a human readable form, said means for displaying being operable responsive to at least one message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system, through the internet and said first telephone exchange switch, said second telephone set further including at least one manual switch for sending a signal to said second telephone exchange switch responsive to said message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system through the internet and said first telephone exchange switch, said signal being indicative of a predetermined response to said message, to connecting said second telephone exchange switch with said first telephone exchange switch using said internet connection, forming predetermined messages for said message exchange using said voice mail system and said second telephone exchange switch, exchanging said predetermined messages between said voice mail system and said second

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telephone exchange switch through said first telephone exchange switch and said internet connection, and operating said means for displaying responsive to at least one message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system.

O'Donovan et al. discloses a method and apparatus for transferring messages between two remote parties (column 1, lines 7-8 fig. 1). O'Donovan et al. teaches a [first telephone exchange switch] PBX 12 (fig. 1). O'Donovan et al. further teaches [second telephone exchange switch] PBX 22 is located remotely from PBX 12 [first telephone exchange switch] (column 5, lines 17-31 fig. 1). O'Donovan et al. also teaches PBX 22 [second telephone exchange switch] is connected to PBX 12 [first telephone exchange switch] through the internet via data network access devices 14 and 24 (column 5, lines 23-31 fig. 1). O'Donovan et al. teaches a telephone [second telephone] is connected to PBX 22 [second telephone exchange switch] (fig. 1).

O'Donovan et al. further teaches Data network access device 24 receives a message from VMS 16 through PBX 12 [first telephone exchange switch], data network access device 14, and the data network 40 [internet]. The message is deposited in VMS 26 via PBX 22 [second telephone exchange switch] [said means for displaying being operable responsive to at least one message received from second telephone exchange switch resulting from said message exchange between second telephone exchange switch and said voice mail system, through the internet and said first telephone exchange switch] [exchanging said predetermined messages between said voice mail system and said second exchange switch through said first telephone exchange switch and said internet connection]. The called party telephone 21 is given an indication of the message by an onscreen display [second telephone set including means for displaying alphanumeric characters

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in a human readable form] (column 7, lines 13-23 fig. 1). O'Donovan teaches a caller at telephone station 11 can receive a prompt from VMS 26 through PBX 22 [second telephone exchange switch] (column 6, lines 51-58). O'Donovan et al. further teaches

It would have been obvious to one with ordinary skill in the art at the time the invention was made to further modify the call answering system of Deutsch et al. to include providing a second telephone exchange switch remotely disposed from said first telephone exchange switch, providing means for electronically connecting said second telephone exchange switch to said first telephone exchange switch through the internet, providing at least one second telephone set in electronic communication with said second telephone exchange switch, said second telephone set including means for displaying alphanumeric characters in a human readable form, said means for displaying being operable responsive to at least one message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system, through the internet and said first telephone exchange switch, said second telephone set further including at least one manual switch for sending a signal to said second telephone exchange switch responsive to said message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system through the internet and said first telephone exchange switch, said signal being indicative of a predetermined response to said message, to connecting said second telephone exchange switch with said first telephone exchange switch using said internet connection, forming predetermined messages for said message exchange using said voice mail system and said second telephone exchange switch, exchanging said predetermined messages between said voice mail system and said second

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telephone exchange switch through said first telephone exchange switch and said internet connection, and operating said means for displaying responsive to at least one message received from said second telephone exchange switch resulting from said message exchange between said second telephone exchange switch and said voice mail system, as taught by O'Donovan, to provide a less expensive telecommunication connection for long distance calls (column 2, lines 18-22).

Regarding claim 31, Deutsch et al. as modified by Rogers et al. in claim 17 above and further modified by O'Donovan et al. in claim 30 teaches, via O'Donovan et al., the called party at telephone set 21 receives an onscreen display indication of a voice message from voice message server 26 via PBX 22 (column 7, lines 20-22). O'Donovan et al. indicates the called lifts the telephone handset to dial VMS 26 to listen to messages (column 7, lines 23-27)[sending a signal using one manual switch].

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Terry Teague whose telephone number is (703) 305-3417. The examiner can normally be reached on 8-4:30pm M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Fan Tsang can be reached on (703) 305-4895. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308-5403 for regular communications and (703) 308-5403 for After Final communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-3900.

tt
July 1, 2002

FAN TSANG
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600

A handwritten signature in black ink, appearing to read 'Fan Tsang', written in a cursive style.